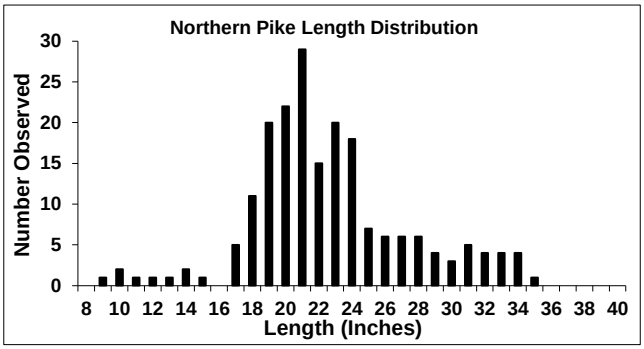
WISCONSIN DNR
FISHERIES INFORMATION SHEET

LAKE: STEVENS LAKE **COUNTY:** FOREST **YEAR:** 2014

The Wisconsin Department of Natural Resources, completed a spring survey of Stevens Lake, Forest County, to analyze the effectiveness of the northern pike regulation. Stevens Lake is located in northeastern Forest County, covers 297 acres and achieves a maximum depth of 10-12 feet.



* Note: Adult northern pike are defined as all sexable pike and pike of unknown sex ≥ 12 inches long.

Northern Pike

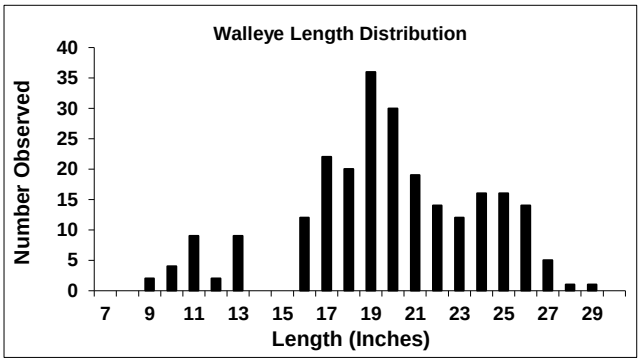
A mark-recapture survey was conducted to estimate the adult northern pike population in Stevens Lake. During this survey we captured and measured 199 different northern pike. The 2014 population estimate suggests that northern pike are the most abundant gamefish in Stevens Lake with a population of approximately 790 adult northern pike (2.7/acre). An abundance of less than 3 adults/acre is slightly below the average density of northern pike in this region.

The size structure of the northern pike population is very good in Stevens Lake with approximately 68.4%, 22.3% and 10.9% of the pike sampled being ≥ 21.0, 26.0 and 30.0 inches respectively. The largest pike captured during our survey was a 35.7-inch female .

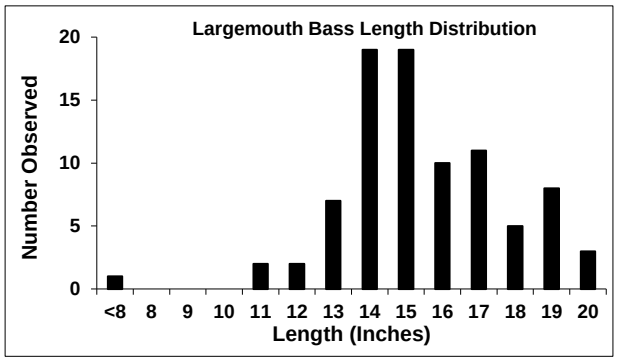
Walleye

A mark-recapture survey was also conducted on the Stevens Lake walleye population. Fyke nets were used to capture and mark (an identifiable fin clip) 106 different adult walleye. On 5/8/2014 the boom shocker was used to capture another 140 adult walleye, 27 of the 140 adult walleye had been marked during the fyke net survey. This data estimates the adult walleye population to be approximately 573 fish (1.9/acre). A population of this size is well above average for the stocked walleye lakes in this region.

Walleye size structure was excellent with approximately 95.4% of the walleye captured being ≥ 15.0 (the legal length limit) and 54.4% of the fish captured being ≥ 20.0 inches. The largest walleye captured was a 29.4-inch female.



* Note: Adult walleye are defined as all sexable walleye and walleye of unknown sex ≥ 15 inches long.



Largemouth Bass

Largemouth bass were collected during the spring fyke net survey, walleye electrofishing survey and two surveys designed for sampling bass. During the bass electrofishing surveys we captured an average of 7.91 adult (≥ 8.0 inches) bass per mile. Based on this catch rate I estimate there to be 2-2.5 adult largemouth bass per acre in Stevens Lake. This is below the average density of largemouth bass in this region (3.8 adults/acre).

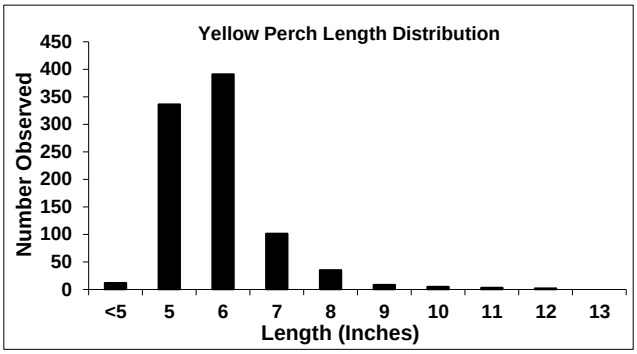
A total of 87 different largemouth bass were captured during this years survey. The size structure of this population is very impressive, with approximately 87.2% and 18.6% of the fish captured being ≥ 14.0 and 18.0 inches respectively.

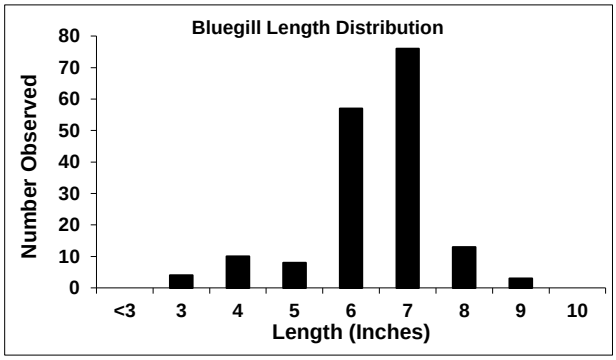
Drafted: July 10, 2014
By: Greg Matzke

Yellow Perch

Yellow perch were captured at a rate of just over 87 fish per net-lift during our spring fyke net survey. This data shows that yellow perch are the most abundant panfish in Stevens Lake. In fact, Stevens Lake has the 2nd highest abundance of yellow perch of all the lakes surveyed in Florence and Forest Counties since 2011.

A random sample of 893 yellow perch were measured to assess the size structure of this population. Size structure was quite poor with only 6.0% of the fish sampled being ≥ 8.0 inches.





Bluegill

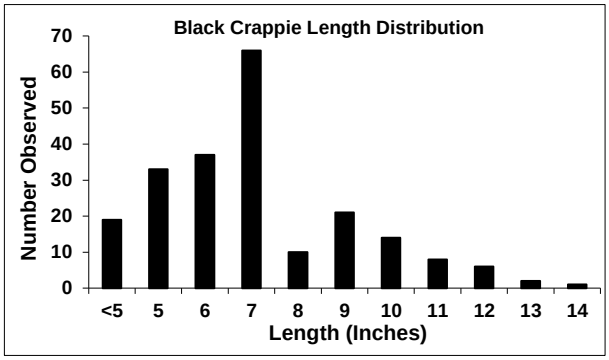
Bluegill are the 2nd most abundant panfish species in Stevens Lake. During the early spring survey relative abundance of bluegill was 32.9 fish per net-lift, while the late spring survey had a catch rate of 14.3 fish per net-lift. All-in-all these numbers suggest a fairly abundant bluegill population.

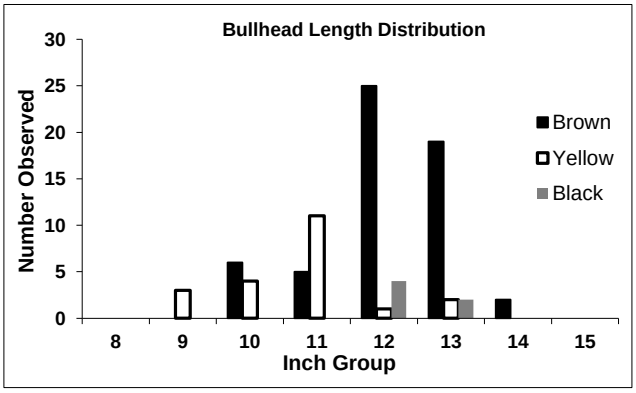
A sample of 173 bluegill were measured to assess size structure. The size structure of this population is quite good with 53.8% of the fish being ≥ 7.0 inches in length.

Black Crappie

Black crappie were the 3rd most abundant panfish during our spring survey, with a relative abundance of 9.8 fish per net-lift.

The size structure of this black crappie population was moderate to good with 15.7% and 4.5% of the fish captured being ≥ 10.0 and 12.0 inches respectively.





Bullhead

All 3 native species of bullhead were found in Stevens Lake during our survey. Brown bullhead was the most abundant species (4.8 fish/net-lift) followed by yellow (1.8 fish/net-lift) and black bullhead (0.5 fish/net-lift) during the late spring netting survey.

All bullhead species showed the ability to get large, however, the size structure of the brown bullhead population was most impressive with 80.7% of the fish being ≥ 12.0 inches in length.

This report is interim only; data and findings should not be considered final.
For answers to questions about fisheries management activites and plans for Stevens Lake contact:

Greg Matzke, Fisheries Biologist
Wisconsin Department of Natural Resources
(715) 528-4400 **Ext:** 122 Email: Gregory.Matzke@Wisconsin.gov

Drafted: July 10, 2014
By: Greg Matzke